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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/771,806	02/04/2004	Brian A. Brown	3338	
75	90 04/03/2006		EXAMINER	
Lloyd Douglas Clark 15 Conrad St			BAREFORD, KATHERINE A	
	CA 94131-2924		ART UNIT	PAPER NUMBER
			1762	<u>.</u>
			DATE MAILED: 04/03/2006	

Please find below and/or attached an Office communication concerning this application or proceeding.

		Application No.	Applicant(s)			
Office Action Summary		10/771,806	BROWN ET AL.			
		Examiner	Art Unit			
		Katherine A. Bareford	1762			
Period fo	The MAILING DATE of this communication app or Reply	ears on the cover sheet with the	correspondence address			
WHIC - Exte after - If NC - Failu Any	ORTENED STATUTORY PERIOD FOR REPLY CHEVER IS LONGER, FROM THE MAILING DY SILONGER, FROM THE MAILING DY SILONGER (S) MONTHS from the mailing date of this communication. O period for reply is specified above, the maximum statutory period vere to reply within the set or extended period for reply will, by statute, reply received by the Office later than three months after the mailing ed patent term adjustment. See 37 CFR 1.704(b).	ATE OF THIS COMMUNICATION 36(a). In no event, however, may a reply be to the apply and will expire SIX (6) MONTHS from the application to become ABANDON	N. imely filed in the mailing date of this communication. ED (35 U.S.C. § 133).			
Status						
1)	Responsive to communication(s) filed on	_ •				
2a) <u></u> ☐	This action is FINAL . 2b)⊠ This action is non-final.					
3)	Since this application is in condition for allowance except for formal matters, prosecution as to the merits is					
	closed in accordance with the practice under E	Ex parte Quayle, 1935 C.D. 11, 4	53 O.G. 213.			
Disposit	on of Claims					
5)□ 6)⊠ 7)□	Claim(s) 1-20 is/are pending in the application. 4a) Of the above claim(s) is/are withdraw Claim(s) is/are allowed. Claim(s) 1-20 is/are rejected. Claim(s) is/are objected to. Claim(s) are subject to restriction and/or	vn from consideration.				
Applicati	on Papers					
9)[The specification is objected to by the Examine	r.	•			
/	D)⊠ The drawing(s) filed on <u>04 February 2004</u> is/are: a)⊠ accepted or b)□ objected to by the Examiner.					
	Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).					
11)	Replacement drawing sheet(s) including the correct The oath or declaration is objected to by the Ex	* * * * * * * * * * * * * * * * * * * *	•			
Priority ι	under 35 U.S.C. § 119					
a)	Acknowledgment is made of a claim for foreign All b) Some * c) None of: 1. Certified copies of the priority documents 2. Certified copies of the priority documents 3. Copies of the certified copies of the priority documents application from the International Bureau See the attached detailed Office action for a list	s have been received. s have been received in Applica rity documents have been receiv u (PCT Rule 17.2(a)).	tion No ved in this National Stage			
Attachmen	t(s)		•			
1) 🛛 Notic	e of References Cited (PTO-892)	4) Interview Summar				
3) Infon	te of Draftsperson's Patent Drawing Review (PTO-948) mation Disclosure Statement(s) (PTO-1449 or PTO/SB/08) r No(s)/Mail Date	Paper No(s)/Mail I 5) Notice of Informal 6) Other:	Date Patent Application (PTO-152)			

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DETAILED ACTION

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Claim Rejections - 35 USC § 112

1. The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

2. Claims 9-15 are rejected under 35 U.S.C. 112, second paragraph, as being

indefinite for failing to particularly point out and distinctly claim the subject matter

which applicant regards as the invention.

In claim 9, this claim is a method claim directed to applying a surface treatment

material to a surface, according to the preamble of the claim. The claim provides the

structure of the cartridge and the attachment to the wiper blade, but does not provide a

positive recitation of actually providing the surface treatment material to the surface as

indicated in the preamble of the claim. For example, instead of indicating that "solvent

will fall upon said opening" for a positive recitation one would provide that "solvent

falls upon said opening". This would apply to the other statements in the claim, as

well. Without the positive recitation, the method described in the preamble is not

present and thus the claim would be confusing as to what is actually intended.

The other dependent claims do not cure the defects of the claims from which

they depend.

Claim Rejections - 35 USC § 103

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- 3. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:
 - (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.
- 4. This application currently names joint inventors. In considering patentability of the claims under 35 U.S.C. 103(a), the examiner presumes that the subject matter of the various claims was commonly owned at the time any inventions covered therein were made absent any evidence to the contrary. Applicant is advised of the obligation under 37 CFR 1.56 to point out the inventor and invention dates of each claim that was not commonly owned at the time a later invention was made in order for the examiner to consider the applicability of 35 U.S.C. 103(c) and potential 35 U.S.C. 102(e), (f) or (g) prior art under 35 U.S.C. 103(a).
- 5. Claims 1-3, 5, 8-11, 13 and 15-18 are rejected under 35 U.S.C. 103(a) as being unpatentable over Rouse (US 4164802) in view of Wright (US 3636582).

Claims 1, 9 and 16: Rouse provides a method and apparatus for applying a surface treatment material to a surface that is wiped with a wiper blade. Figures 1 and 3 and column 1, lines 40-60. The wiper blade has a predetermined rest position and a range of active positions where a blade is made to wipe a surface. Figure 1, column 1, lines 50-60 and column 2, lines 15-25 (the vehicle windshield wiper would have a rest position when turned off and a range of active positions when turned on as the wiper

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sweeps over the windshield). The device includes a cartridge containing a solventdissolvable surface-treatment material. Figure 1 and column 2, lines 20-35 and column 1, lines 50-60 (rain water (as solvent) dissolves the detergent surface-treatment material). The surface-treatment material is described as a detergent. Column 2, lines 20-30. The cartridge contains an opening of predetermined size for allowing a solvent applied to said cartridge from a predetermined direction to reach said solventdissolvable surface-treatment material in said cartridge. Figures 1 and 3, column 1, lines 50-60 and column 3, lines 45-55 (opening 41). Means for attaching said cartridge to the wiper blade is provided so that when the wiper blade is in the rest position and said solvent is applied to the surface from said predetermined direction, the solvent will not directly fall upon said opening and thereby will not tend to dissolve the solventdissolvable surface-treatment material. Figure 1, column 1, lines 50-60 and column 2, lines 25-35. However, when the wiper blade is made to wipe the surface and said solvent is applied to the cartridge from the predetermined direction, the solvent will fall upon an opening, reach, and thereby dissolve the solvent-dissolvable surface-treatment material, so that dissolved solvent-dissolvable surface-treatment material will reach the surface. Figure 1, column 1, lines 50-60 and column 3, lines 45-55 (the air currents provide the rain water in the correct direction). Thus, the surface treatment material will not be subject to ablation unless the wiper blade is in an active position. Column 1, lines 50-60.

Claims 2, 10 and 17: the surface is a vehicle windshield. Figure 1 and column 2, lines 15-25. The solvent-dissolvable surface-treatment material is water-soluble. Column 1, lines 50-60. The solvent is rainwater. Column 1, lines 50-60. The direction is generally above said cartridge. Figure 1, column 1, lines 50-60 and column 3, lines 45-55 (note the flow of rain and also the direction the air currents can be in).

Claims 3,11 and 18: the cartridge can be made from plastic. Column 1, lines 40-45.

Claims 5 and 13: the attaching means can be a clip. Figure 1 and column 2, lines 25-35 (clamp 22 would read on a "clip").

Rouse teaches all the features of these claims except (1) that the surface-treatment material is specifically wetting or hydrophobic and (2) that the cartridge is attached to a channel which holds the wiper blade (claims 5 and 16).

However, Wright teaches a windhshield wiper with an attachment, which, when the windshield is wetted and the wiper reciprocated, will dispense amounts of dissolved cleaning agent onto the windshield so as to dissolve and/or loosen dirt, grime, road film, grease or the like. Figures 1 and 2 and column 1, lines 1-5. A solid cleansing agent/detergent is provided in a porous plastic "sack" container. Column 3, lines 15-20, column 2, lines 10-25 and figure 2. The container can be attached to the channel which holds the wiper blade. Figure 2 and column 1, lines 65-75. Wright teaches that most cleaning agents are so called "wetting agents" and the solution applied to the windshield will therefore prevent drop formation and form a uniform

wetting of the windshield which prevents distortion of vision through the windshield. Column 2, lines 55-65.

It would have been obvious to one of ordinary skill in the art at the time the invention was made to modify Rouse to provide that the detergent surface-treatment material is a wetting agent as suggested by Wright with an expectation of desirable cleaning and viewing results, because Rouse teaches to provide a detergent attachment to a windshield wiper so that when the wiper is used, when water is applied to the windshield, detergent will dissolve and be applied to the windshield, and Wright teaches that when providing a detergent attachment to a windshield wiper so that when the wiper is used, when water is applied to the windshield, detergent will dissolve and be applied to the windshield, it is desirable to use a wetting agent form of cleansing agent, so that the solution applied to the windshield will therefore prevent drop formation and form a uniform wetting of the windshield which prevents distortion of vision through the windshield. It would further have been obvious to modify Rouse to provide that the cartridge can be attached to a channel which holds the wiper blade as suggested by Wright in order to provide a desirable cleaning and viewing result, because Rouse teaches to provide a detergent attachment to a windshield wiper so that when the wiper is used, when water is applied to the windshield, detergent will dissolve and be applied to the windshield, and Wright teaches that when providing a detergent attachment to a windshield wiper so that when the wiper is used, when water is applied to the windshield, detergent will dissolve and be applied to the windshield, it

is desirable to apply the detergent attachment such that it is attached to a channel which holds the wiper blade.

6. Claims 4, 12 and 19 are rejected under 35 U.S.C. 103(a) as being unpatentable over Rouse in view of Wright as applied to claims 1-3, 5, 8-11, 13 and 15-18 above, and further in view of Turcotte et al (US 6461537).

Rouse in view of Wright teaches all the features of these claims except that the surface-treatment material is insoluble in water and the solvent is an inorganic or organic solvent.

However, Turcotte et al teaches that for windshield cleaning, it is conventionally known to use, in the underhood reservoir, a solvent based system that includes a surfactant and are methanol-water based to offer improved free protection in winter.

Column 1, lines 20-35.

It would have been obvious to one of ordinary skill in the art at the time the invention was made to modify Rouse in view of Wright to provide that the detergent surface-treatment material dissolveable only in an organic solvent such as methanol as suggested by Turcotte et al with an expectation of desirable cleaning and viewing results, because Rouse in view of Wright teaches to provide a detergent attachment to a windshield wiper so that when the wiper is used, when water is applied to the windshield, which would include water applied by the underhood reservoir, detergent will dissolve and be applied to the windshield, and Turcotte et al teaches that when

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providing cleaning material from an underhood reservoir, it is well known to use a methanol and water based system. This would suggest to one of ordinary skill in the art that a detergent material that was only dissolvable in organic solvent such as methanol could desirably be used as well, so that detergent would only be applied when desired, by operating the underhood reservoir, rather than every time it rained.

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7. Claims 7, 14 and 20 are rejected under 35 U.S.C. 103(a) as being unpatentable over Rouse in view of Wright as applied to claims 1-3, 5, 8-11, 13 and 15-18 above, and further in view of Reynolds (US 3103686).

Rouse in view of Wright teaches all the features of these claims except that the cartridge is formed in the structure of the wiper blade.

However, Reynolds teaches that for windshield cleaning, it is conventionally known to provide, inside of the wiper blade itself, a solid cleaning and degreasing material that is dissolved by water applied to the blade. Figures 1 and 2 and column 1, lines 5-45.

It would have been obvious to one of ordinary skill in the art at the time the invention was made to modify Rouse in view of Wright to provide that the cartridge is provided in the structure of the wiper blade itself as suggested by Reynolds with an expectation of desirable cleaning results, because Rouse in view of Wright teaches to provide a detergent attachment to a windshield wiper so that when the wiper is used, when water is applied to the windshield, detergent will dissolve and be applied to the

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windshield, and Reynolds teaches that when providing solid cleaning material that dissolves in water to apply cleaning material to the wiper blade, it is well known to provide the material inside the structure of the wiper blade itself.

8. Claims 1-3, 5, 6, 8-11, 13 and 15-18 are rejected under 35 U.S.C. 103(a) as being unpatentable over Nixdorf et al (US 4202069) in view of Wright (US 3636582).

Claims 1, 9 and 16: Nixdorf et al provides a method and apparatus for applying a surface treatment material to a surface that is wiped with a wiper blade. Figures 1 and 6 and column 2, lines 20-30. The wiper blade has a predetermined rest position and a range of active positions where a blade is made to wipe a surface. Figure 1, column 2, line 60 through column 3, line 10 and column 4, lines 5-15 (the vehicle windshield wiper would have a rest position when turned off and a range of active positions when turned on as the wiper sweeps over the windshield). The device includes a cartridge containing a solvent-dissolvable surface-treatment material. Figures 1 and 6 and column lines30-45 (rain water (as solvent) dissolves the cleaning agent surface-treatment material). The surface-treatment material is described as a cleaning agent. Column 2, lines 30-40. The cartridge contains an opening of predetermined size for allowing a solvent applied to said cartridge from a predetermined direction to reach said solventdissolvable surface-treatment material in said cartridge. Figures 1-3 and 6, column 2, line 60 through column 3, line 10 and column 5, lines 35-45. Means for attaching said cartridge to the wiper blade is provided so that when the wiper blade is in the rest

position and said solvent is applied to the surface from said predetermined direction, the solvent will not directly fall upon said opening and thereby will not tend to dissolve the solvent-dissolvable surface-treatment material. Figure 1, column 4, lines 5-30. However, when the wiper blade is made to wipe the surface and said solvent is applied to the cartridge from the predetermined direction, the solvent will fall upon an opening, reach, and thereby dissolve the solvent-dissolvable surface-treatment material, so that dissolved solvent-dissolvable surface-treatment material will reach the surface. Figures, 1-3 and 6, column 2, line 60 through column 3, line 10 and column 5, lines 35-45 (the slipstream, or air currents, provide the rain water in the correct direction). Thus, the surface treatment material will not be subject to ablation unless the wiper blade is in an active position. Column 4, lines 5-30.

Claims 2, 10 and 17: the surface is a vehicle windshield. Column 1, lines 5-10. The solvent-dissolvable surface-treatment material is water-soluble. Column 2, line 60 through column 3, line 10. The solvent is rainwater. Column 2, line 60 through column 3, line 10. The direction is generally above said cartridge. Column 2, line 60 through column 3, line 10 (note the flow of rain and also the direction the air currents can be in).

Claims 3,11 and 18: the cartridge can be made from plastic. Column 3, lines 25-35.

Claims 5 and 13: the attaching means can be a clip. Figure 1 and column 5, lines 1-15 (clamp 14 would read on a "clip").

Claim 6: the cartridge can be formed within the structure of a wiper arm. Figure 6 and column 7, lines 1-10.

Nixdorf et al teaches all the features of these claims except (1) that the surfacetreatment material is specifically wetting or hydrophobic and (2) that the cartridge is attached to a channel which holds the wiper blade (claims 5 and 16).

However, Wright teaches a windhshield wiper with an attachment, which, when the windshield is wetted and the wiper reciprocated, will dispense amounts of dissolved cleaning agent onto the windshield so as to dissolve and/or loosen dirt, grime, road film, grease or the like. Figures 1 and 2 and column 1, lines 1-5. A solid cleansing agent/detergent is provided in a porous plastic "sack" container. Column 3, lines 15-20, column 2, lines 10-25 and figure 2. The container can be attached to the channel which holds the wiper blade. Figure 2 and column 1, lines 65-75. Wright teaches that most cleaning agents are so called "wetting agents" and the solution applied to the windshield will therefore prevent drop formation and form a uniform wetting of the windshield which prevents distortion of vision through the windshield. Column 2, lines 55-65.

It would have been obvious to one of ordinary skill in the art at the time the invention was made to modify Nixdorf et al to provide that the cleaning agent surface-treatment material is a wetting agent as suggested by Wright with an expectation of desirable cleaning and viewing results, because Nixdorf et al teaches to provide a cleaning agent attachment to a windshield wiper so that when the wiper is used, when

water is applied to the windshield, the cleaning agent will dissolve and be applied to the windshield, and Wright teaches that when providing a cleaning agent attachment to a windshield wiper so that when the wiper is used, when water is applied to the windshield, cleaning agent will dissolve and be applied to the windshield, it is desirable to use a wetting agent form of cleansing agent, so that the solution applied to the windshield will therefore prevent drop formation and form a uniform wetting of the windshield which prevents distortion of vision through the windshield. It would further have been obvious to modify Nixdorf et al to provide that the cartridge can be attached to a channel which holds the wiper blade as suggested by Wright in order to provide a desirable cleaning and viewing result, because Nixdorf et al teaches to provide a cleaning agent attachment to a windshield wiper so that when the wiper is used, when water is applied to the windshield, cleaning agent will dissolve and be applied to the windshield, and Wright teaches that when providing a cleaning agent attachment to a windshield wiper so that when the wiper is used, when water is applied to the windshield, cleaning agent will dissolve and be applied to the windshield, it is desirable to apply the cleaning agent attachment such that it is attached to a channel which holds the wiper blade.

9. Claims 4, 12 and 19 are rejected under 35 U.S.C. 103(a) as being unpatentable over Nixdorf et al in view of Wright as applied to claims 1-3, 5, 6,8-11, 13 and 15-18 above, and further in view of Turcotte et al (US 6461537).

Nixdorf et al in view of Wright teaches all the features of these claims except that the surface-treatment material is insoluble in water and the solvent is an inorganic or organic solvent.

However, Turcotte et al teaches that for windshield cleaning, it is conventionally known to use, in the underhood reservoir, a solvent based system that includes a surfactant and are methanol-water based to offer improved free protection in winter.

Column 1, lines 20-35.

It would have been obvious to one of ordinary skill in the art at the time the invention was made to modify Nixdorf et al in view of Wright to provide that the cleaning agent surface-treatment material dissolveable only in an organic solvent such as methanol as suggested by Turcotte et al with an expectation of desirable cleaning and viewing results, because Nixdorf et al in view of Wright teaches to provide a cleaning agent attachment to a windshield wiper so that when the wiper is used, when water is applied to the windshield, which would include water applied by the underhood reservoir, cleaning agent will dissolve and be applied to the windshield, and Turcotte et al teaches that when providing cleaning material from an underhood reservoir, it is well known to use a methanol and water based system. This would suggest to one of ordinary skill in the art that a cleaning agent material that was only dissolvable in

organic solvent such as methanol could desirably be used as well, so that cleaning agent would only be applied when desired, by operating the underhood reservoir, rather than every time it rained.

10. Claims 7, 14 and 20 are rejected under 35 U.S.C. 103(a) as being unpatentable over Nixdorf et al in view of Wright as applied to claims 1-3, 5, 6, 8-11, 13 and 15-18 above, and further in view of Reynolds (US 3103686).

Nixdorf et al in view of Wright teaches all the features of these claims except that the cartridge is formed in the structure of the wiper blade.

However, Reynolds teaches that for windshield cleaning, it is conventionally known to provide, inside of the wiper blade itself, a solid cleaning and degreasing material that is dissolved by water applied to the blade. Figures 1 and 2 and column 1, lines 5-45.

It would have been obvious to one of ordinary skill in the art at the time the invention was made to modify Nixdorf et al in view of Wright to provide that the cartridge is provided in the structure of the wiper blade itself as suggested by Reynolds with an expectation of desirable cleaning results, because Nixdorf et al in view of Wright teaches to provide a cleaning agent attachment to a windshield wiper so that when the wiper is used, when water is applied to the windshield, cleaning agent will dissolve and be applied to the windshield, and Reynolds teaches that when providing solid cleaning material that dissolves in water to apply cleaning material to the wiper

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blade, it is well known to provide the material inside the structure of the wiper blade itself.

Conclusion

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Katherine A. Bareford whose telephone number is (571) 272-1413. The examiner can normally be reached on M-F(6:00-3:30) with the First Friday Off.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Timothy Meeks can be reached on (571) 272-1423. The fax phone numbers for the organization where this application or proceeding is assigned are (571) 273-8300 for regular communications and for After Final communications.

Other inquiries can be directed to the Tech Center 1700 telephone number at (571) 272-1700.

Furthermore, information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

(ATHERINE BAREFORD PRIMARY EXAMINER

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